

Amendments to the Specification

Please replace the paragraph beginning on page 3, line 8 with the following amended paragraph:

As more demanding applications are envisioned for filtration media, significantly improved materials are required to withstand the rigors of high temperature 100°F to 250°F ~~and up to 300°F, or about 140°F to 300°F and higher,~~ at high humidity 10% to 90% up to 100% RH, high flow rates of both gas and liquid, and filtering micron and submicron particulates (ranging from about 0.01 to over 10 microns) and removing both abrasive and non-abrasive and reactive and non-reactive particulate from the fluid stream.

Please amend page 51 of the specification as follows and now presented in portrait orientation.

Example 18

The following filter ~~media~~ composite materials have been made with the listed substrate using the methods described in Example 1-17.

Filter Media Examples

| Substrate | Substrate perm (Frazier) | Substrate Basis wt (lbs/3000 sq ft) | Substrate Thickness (in) | Substrate Eff (LEFS) | Composite Eff (LEFS (LEFS)) |
|---|--------------------------|-------------------------------------|--------------------------|----------------------|-----------------------------|
| Single fine fiber layer on single substrate (flow either direction through media) | (+/- 10%) | (+/- 10%) | (+/- 25%) | (+/- 5%) | (+/- 5%) |
| Cellulose air filter media | 58 | 67 | 0.012 | 11% | 50% |
| Cellulose air filter media | 16 | 67 | 0.012 | 43% | 58% |
| Cellulose air filter media | 58 | 67 | 0.012 | 11% | 65% |
| Cellulose air filter media | 16 | 67 | 0.012 | 43% | 70% |
| Cellulose air filter media | 22 | 52 | 0.010 | 17% | 70% |
| Cellulose air filter media | 16 | 67 | 0.012 | 43% | 72% |
| Cellulose/synthetic blend with moisture resistant resin | 14 | 70 | 0.012 | 30% | 70% |
| Flame retardant cellulose air filter media | 17 | 77 | 0.012 | 31% | 58% |

Please amend page 52 of the specification as follows and now presented in portrait orientation.

Filter Media Examples (Continued)

| Substrate | Substrate perm (Frazier) | Substrate Basis wt (lbs/3000 sq ft) | Substrate Thickness (in) | Substrate Eff (LEFS) | Composite Eff (LEFS (LEFS)) |
|---|--------------------------|-------------------------------------|--------------------------|----------------------|---|
| Flame retardant cellulose air filter media | 17 | 77 | 0.012 | 31% | 72% |
| Flame retardant synthetic air filter media | 27 | 83 | 0.012 | | 77% |
| Spunbond Remay <u>Reemay</u> (polyester) | 1200 | 15 | 0.007 | 5% | 55% |
| Synthetic/cellulose air filter media | 260 | 76 | 0.015 | 6% | 17% |
| Synthetic/glass air filter media | 31 | 70 | 0.012 | 55% | 77% |
| Synthetic/glass air filter media | 31 | 70 | 0.012 | 50% | 90% |

Please amend page 53 of the specification as follows and now presented in portrait orientation.

Filter Media Examples (Continued)

| Substrate | Substrate perm (Frazier) | Substrate Basis wt (lbs/3000 sq ft) | Substrate Thickness (in) | Substrate Eff (LEFS) | Composite Eff (LEFS (LEFS)) |
|--------------------------------|--------------------------|-------------------------------------|--------------------------|----------------------|---|
| | | | | | |
| Synthetic (Lutrador-polyester) | 300 | 25 | 0.008 | 3% | 65% |
| Synthetic (Lutrador-polyester) | | | 0.016 | | 90% |

Media has been used flat, corrugated, pleated, corrugated and pleated, in flatsheets, pleated flat panels, pleated round filters, and other filter structures and configurations.